Several Slots Available for this Excellent Opportunity ...

INNOVATIVE DESIGN ENGINEERING AND APPLICATIONS (IDEA 2)

Marshall Space Flight Center, Marshall Center

June 29- July 1, 2004

If you have been through this program already and know someone else who might be interested please pass this information along!

Please consult your Training Point of Contact, listed below, for the proper procedure to follow in applying to attend this program.

PROGRAM OVERVIEW:

Sending hardware to Mars represents one of the most challenging engineering feats for mankind. To date NASA's efforts have been directed at unmanned missions to Mars. Over the decades, we have witnessed incredible achievements along with demoralizing losses. During the class, you will apply the principles of lean design methods to a Mars sample return mission in order to generate innovative and creative product designs and solutions. The course is designed to enable you consider a mission to Mars as a "problematic" challenge, rather than a "programmatic" one. In other words, you will approach a Mars mission more from a hands-on, technical perspective, and rely less on the programmatic alternatives. You will explore and examine the idea of designing, developing, and manufacturing hardware within the engineering and physical constraints posed by landing hardware on the surface of Mars.

TARGET AUDIENCE:

NASA Project Managers, engineers, designers, and technicians and those who are interested in exploring new design methods and practices to generate innovative and creative product designs and solutions.

FORMAT:

The three-day hands-on workshop will explore and analyze new design methodologies to accomplish the exploration of Mars and learn about the Red Planet.

LEARNING OBJECTIVES:

Upon completion of this course, you will be able to:

- Describe best product design methods and practices in industry.
- Describe the key elements of a problematic approach to space mission design and development.
- Develop new design methodologies for Mars exploration.
- Explain the product life cycle process.
- Apply lean design principles and methodologies
- Explain the technological challenges involved in Mars exploration.
- Apply appropriate new design ideation techniques (including creative design methods) in designing a return mission to Mars.
- Explain interactive prototyping and rapid prototyping methods.
- Identify cognitive engineering techniques and explain the supporting usability studies.
- Describe the process for developing solid system architecture.
- Apply qualitative and quantitative tools to assess design capabilities and usability.

TRAINING SITE INFORMATION:

MSFC, Marshall Center is the location for IDEA 2 (6/29-7/1). For those participating in this non-residential program from NASA Centers other than MSFC, your Center will be responsible for travel, food and lodging. NASA HQ will cover tuition.

HOW TO REGISTER

For a nomination form, please visit: http://nasapeople.nasa.gov/training/nomform/netform.doc

Please have the form filled out completely and consult your Training Point of Contact for the proper procedure to follow to apply to attend this program. Register ASAP.

Center – Training Point of Contact:
ARC – Claire Smith, 650-604-0553
DFRC – James Lucero, 651-276-2460
GRC – Nona Akos, 216-433-8520
GSFC – Diane Severn, 301-286-4121
HQ – Sheila Jackson, 301-286-2022
JPL – Mark Lopez, 818-393-6878 or Sandy Dennis, 818-354-3751

JSC – Cheryl Mintz, 281-483-3003
KSC – Mark Thompson, 321-867-2351
LaRC – Rebecca Howlett 757-864-3623 or Angie Greene, 757-864-8238
MSFC – Georgann Crump, 256-544-6525
SSC – Anita Douglas, 601-688-3697

IF YOU HAVE ANY QUESTIONS:
Please contact Gina Coluzzi (RGI, Inc) at 703-820-4900, extension 110, or via email at gcoluzzi@rgi-inc.com.

For more information about NASA training programs, please visit:
http://nasapeople.nasa.gov